

Amendment and Response

Page 2 of 10

Serial No.: 09/641,802

Confirmation No.: 5387

Filed: August 17, 2000

For: USE OF COLOSTRININ, CONSTITUENT PEPTIDES THEREOF, AND ANALOGS THEREOF TO
PROMOTE NEURONAL CELL DIFFERENTIATION

colostrinin, a constituent peptide thereof, an active analog thereof, and combinations thereof, under conditions effective to change the pluripotent cells of the nervous system in morphology to form neuronal cells; wherein the active analog comprises a peptide having an amino acid sequence with at least about 15 percent proline and having at least about 70 percent structural similarity to one or more constituent peptides of colostrinin, which are selected from the group of SEQ ID NO:1 through SEQ ID NO:34.

17. A method for promoting neuronal cell differentiation in a patient, the method comprising administering to the patient a neuronal cell regulator selected from the group of colostrinin, a constituent peptide thereof, an active analog thereof, and combinations thereof, under conditions effective to promote differentiation of pluripotent cells of the nervous system to form neuronal cells; wherein the active analog comprises a peptide having an amino acid sequence with at least about 15 percent proline and having at least about 70 percent structural similarity to one or more constituent peptides of colostrinin, which are selected from the group of SEQ ID NO:1 through SEQ ID NO:34.